DOCUMENT RESUME

ED 359 180 SP 034 626

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TITLE The Effect of a Longitudinal Teaching Methodology and Classroom Environment on Both Cognitive and Behavioral Moral Development.

PUB DATE Mar 93

NOTE 24p.; Paper presented at the Annual Meeting of the American Alliance for Health, Physical Education, Recreation and Dance (Washington, DC, March 24-28, 1993).

PUB TYPE Speeches/Conference Papers (150) -- Reports - Research/Technical (143)

EDRS PRICE MF01/PC01 Plus Postage.

DESCRIPTORS *Athletes; *Behavior Change; *Cognitive Structures; College Students; Developmental Stages; Ethical Instruction; Higher Education; Longitudinal Studies; *Moral Development; *Moral Values; Physical Education; Program Design; Sportsmanship; *Student Behavior; Teaching Methods

IDENTIFIERS Kohlberg (Lawrence); Piaget (Jean)

ABSTRACT

Moral education is becoming one of the most important topics in school systems today. Schools are fast learning that they must do something to try to teach students good values and even more to teach students how to reason about values. Research studies suggest that athletes are less morally reasoned and less sportsmanlike than their peer groups; that competitive sport places participants in conflict situations where winning is emphasized more than sportsmanship or fairplay; and that a negative relationship exists between moral development and participation in sport. This paper describes a study conducted to analyze the effect of a specific teaching methodology--an intervention based on Piagetian and Kohlbergerian psychology tempered with philosophical theory. The program's goal is to improve cognitive moral development from a hedonistic stage of reasoning to a more autonomous decision making stage. Using qualitative methods, significant behavior changes in student athletes were charted over a 3-year period: fighting decreased, caring about others increased, and classroom behavior and grades improved. The research presented highlights the statistical results, teaching methodology, and classroom environment necessary to bring about both cognitive and behavioral changes in moral development. (LL)

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The Effect of a longitudinal Teaching Methodology and Classroom Environment on Both Cognitive and Behavioral Moral Development

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RUNNING HEAD: The Effect of a Longitudinal Teaching Metholodology

Presentation to the Research Consortium of the
American Alliance for Health, Physical Education,
Recreation, & Dance's
Annual Convention, Washington D.C.

March, 1993

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ABSTRACT

The purpose of this study was to analyze the effect of a specific teaching methodology and classroom environment on both cognitive and behavioral development. Moral education is fast becoming one of the most important topics in school systems today. Leaders have stated that schools must lead the battle against the worst psychosocial epidemics that have ever plagued the children of our society. There is a call for school programs to protect children against the ravages of social disorganization and family collapse. Schools are fast learning that they must do something to try to teach children good values and even more to teach children how to reason about values. The problem for teachers however is what to teach, how to teach it, and will it be effective. Moral Development research in physical education as well as the classroom in particular has not been subjected to a controlled research evaluation, most studies are subjective and questionable as to validity and reliability. As research learning theorists, we believe it is possible to institute a long term moral reasoning program that could meet the rigor of valid and reliable research methods. Using Piaget and Kohlbergerian psychology, tempered with philosophical theory, and combined in a caring, democratic classroom, we were able to show positive quantitative and qualitative improvements in moral development. Using the DIT, students enrolled in our intervention significantly improved in their cognitive moral development from a hedonistic stage (23.9 ± 3.16 SEM) of reasoning to a more autonomous decision making stage of

development, (33.5 ± 3.10 SEM) n = 250. Using qualitative methods, we were able to chart significant behavior changes of our subjects over a three year period, i.e., fighting decreased, caring about others increased, classroom behavior improved, and grades improved. The research presented will highlight the statistical results, as well as, teaching methodology, and the classroom environment necessary to bring about both cognitive and behavioral changes in moral development.

What is Morality, Moral Reasoning, and Moral Development?

Moral values are the relative worth that we place on some virtuous behavior. In a technical sense, moral pertains to an individual's actions as being right or wrong, virtuous or vicious, or good or bad in relations to actions, intentions, or motives of responsible people.

Moral reasoning is a problem solving activity, a way of trying to find answers, a way of critiquing questions and answers. The process is not limited to a defensive position of what we believe or know to be right, but rather, the purpose is to discover the truth. However, moral reasoning is not moralizing, whereby morality is prescribed or interpreted for others. Moralizing gives moral direction or tells what is the right way. In contrast, moral reasoning asks that each of us think consistently, reflectively, and impartially for ourselves and have the courage to take a stand. The goal of moral reasoning is to find the morally reasoned view for each of us rather than tell others what should be.

Moral development is dependent on moral reasoning and based on: 1) What is right, 2) Why it is right, and 3) What social-moral perspectives underlie the reasoning. Kohlberg, a pioneer in cognitive moral development theory, identified six invariant stages, with two levels each that individuals may move through as they develop cognitively.

Preconventional thinking, comprised of stage one and two is characterized by an ego-centric approach to morality (Kohlberg, 1981). Individuals within stage one are unaware

of how rules impact moral responsibility, with rightness based on motivation to avoid punishment and obey authority, with little or no consideration for others' interests. In stage two, rightness is determined by satisfaction of one's own interests and needs, with only instrumental concern for others.

The conventional levels involve stage three and four, which reflect an understanding for societal roles in solving moral dilemmas (Kohlberg, 1981). In stage three, rightness is based on doing good to and for others and putting oneself in another's place. With stage four, rightness is motivated by respecting authority, following rules, and maintaining social order and based on duty to the social order, society, or group.

The post-conventional level, the final two stages, plus a transition stage (four and a half) reflects universal or principled moral thinking. Regardless of societal norms, individuals within the postconventional level recognize the universal applicability of moral values.

What is Moral Character Education?

Our premise about moral education and it; goal of character development, supported by the work of Lickona, Kohlberg, and Piaget, depends on three different aspect: Moral Knowing, Moral Valuing, and Moral Acting (see Figure 1). Moral knowing is the cognitive phase of learning about moral issues and how to resolve them (Lickona, 1992). Moral valuing is the basis of what we believe about ourselves, society, and others around us, while moral

acting is our outward behavior that we manifest contingent on our values and cognitive processes. While moral knowing does not mean consistent moral acting, it is imperative and the precursor to moral action.

Insert Figure 1 about here

Why Moral Reasoning/Development Programs for Athletic Populations?

Studies involving sport populations from the 1960s to present, including our own, have found that: a) athletes are less morally reasoned than their peer groups, b) athletes are less sportsmanlike than their peer population, c) athletes exhibit aggressive behaviors more so than their peer population, and d) the longer athletes are in sport the less reasoned they become (Hahm, 1989; Beller & Stoll, 1990, 1992, 1993; Bredemeier & Shields, 1986; Coakley, 1990; Wandzilak, Carroll, & Ansorge, 1988; Penny & Priest, 1990). They all concluded that competitive sport places participants in conflict situations where winning is emphasized more than sportsmanship or fairplay. Their research implies that a negative relationship exists between moral development and participation in sport. Moral reasoning studies by Beller & Stoll (1990-93) have found that a steady, deliberate decrease in moral reasoning occurs the longer athletes compete in organized sport. Essentially, ninth grade athletes reason better than university age athletes (see Figure 2).

Insert Figure 2 about here

What is the ETHICS* Moral Reasoning/Development Program?

The conceptual framework in ETHICS* moral reasoning intervention program is based on: 1) A philosophy of learning and 2) a specific content and methodological model, the SBH* Maieutic Standard. This approach views all learning as embodied, interactive social, and integrative cognitive.

Embodied:

The embodied process is concerned with the human experience. The learner is a body; we learn with our bodies and through our bodies. All learning and all knowing comes to us through our bodies (Merleu-Ponty). We are a whole who expresses through this body. Whatever difference exists between mind knowing and bodily knowing is negligent. All knowing occurs through skilled activity; all human intelligence, creativity, ingenuity is expressed in the summed whole of physical activity and bodily knowing. The learner must be an active learner; the learning climate must be focused on the learner.

Interactive Social:

Learning is an interactive social process. Gill (1993) has stated that all knowing is a social process. We learn by a symbolic interaction through language, which is the fundamental social tool in which we learn. It is a group

dance in which we dance together to know and to learn. Learning therefore takes into consideration the class as a group, a social group in which ALL members are imperative to the learning process. All members must become active throughout the process and be a part of what Kohlberg calls cognitive disequilibrium. The learner is challenged by his or her peers to look at personal beliefs, the beliefs of others, issues and problems in alternative and different ways.

Integrative Cognitive:

The learner is placed into a spectrum whereby cognitive material is used to get a "handle on" what is. The learner must use all cognitive materials, print, screen, video, and ideas, to come to terms with different concepts. The learner pulls these sources together through the embodied subject to learn and to know.

What is the SBH* Maieutic Method?

The strength of this program lies in its teaching methodology. This methodology is a radical departure from the typical lecture information-centered approach. The methodology challenges students to defend and criticize moral positions and have the courage to take a stand.

The maieutic method resembles Socratic, with the teacher using questioning to stimulate dialogue and social interaction. When making decisions, students use readings, class interactions, current events, and personal values and beliefs of others. Through both speaking and writing, students support what they would do in specific and general

situations. The methodology is process-centered with the student the learner-discoverer and teacher a moderator-facilitator. For the process to succeed, the student must be the central focus. The methodology's success is dependent on: 1) a caring, democratic classroom and 2) the teacher as a facilitator-moderator.

What is a Caring, Democratic Classroom?

The classroom is founded in mutual respect, trust, and an ethic of caring which determines the magnitude of the dialogue, social interaction, and learning. If students feel comfortable to examine their own values and beliefs, they will speak-up and risk solutions. The more secure they feel, the less afraid they are to respond. A democratic environment which fosters respect for self and others occurs when the focus is on the embodied learner.

What is the Teacher as a Facilitator-Moderator?

The teacher sets the tone from which all discussions, arguments, and questions occur. The teacher must care about the students, know about them as individuals with unique opinions, knowledges, and experiences. When the teacher knows about each student, dialogue and social interaction are enhanced. Moreover, knowing about a student gives the teacher a background from which to begin the dialogue and social interaction process.

The teacher challenges participants to argue, question, discuss, and understand an issue and all its collateral fibers when making moral decisions. The teacher challenges students to think for themselves, respond to and ask

important questions, pursue arguments, defend a point of view, understand antagonistic views, and weigh alternatives.

Using higher order questions, the teacher questions, probes, and sometimes suggests alternative perspectives. This procedure causes students to experience cognitive dissonance. Students re-examine what they believe relative to the facts, others views, principles, social justice, reversibility, and universalizability. Students wrestle with the issue to reflect, analyze, evaluate, provide reasons, and search for alternatives. The teacher never gives the answer, but must be patient and wait for student response. The teacher cannot interrupt or cause the students to think that there is only one right answer.

Although the student is the focus, the teacher has a highly dynamic role. The role, based on a learned skill, is the ability to effectively dialogue which is based on four modalities: listening, effective discussion, assertiveness, and empathy.

Listening:

Good listening skills are essential for learning to occur. Two general listening modes exist: the Persuasion mode and the listening mode. Persuasion is the least effective, non-preferred, and most common method of argumentation. This mode defends ideas and attacks the ideas and beliefs of others. Participants exert their own opinions and beliefs usually through interruption, domination, and manipulation.

Reasoned argumentation is based on the listening mode. Both teacher and student must LISTEN to others without interrupting of forcing personal views. The teacher asks students to clarify until each understands all ambiguities. All must realize agreement may not occur. Both teacher and students must collaborate to clarify misunderstandings and share intellectual reasons for particular positions. The dialogue process must also challenge students to the listening mode.

If participants develop a listening mode, they can formulate plans for effective discussions. If the teacher listens carefully to each student's comments, the discussion can proceed in many directions. To discuss effectively, participants must combine ethical theory and specific content material. Through integration, both teacher and students can formulate logical propositions about moral issues. All problems and issues have more than one appropriate answer. Often, discussions must be left open-ended, providing incentive for further reflection.

Assertiveness:

Open debate between the embodied teacher and students involves both assertiveness and empathy. Assertiveness is the legitimate and honest expressions of one's personal rights, feelings, beliefs, and interests without violating or denying the rights of others. The teacher, as well as students must know what they believe, why they believe as such, and how the belief is functional or non-functional in a society relative to the beliefs of others.

Empathy:

Empathy takes the edge off of assertiveness. To be empathetic rather than sympathetic requires that teachers have the ability to identify and sensitively reponed to the feelings and ideas of others without being emotionally drawn into their problem or view.

Content:

Content is based in theory, current events, an practical application. Participants have an arsenal of material to address weighty individual and societal moral questions. Students examine their beliefs, awaken to their values, establish moral principles, and reason daily rules. They use reasoned arguments to examine moral issues and systematically argue particular views.

How Do We Measure Moral Development?

Rest's Defining Issues Test (1981), based on Kohlberg's (1981) six stages of cognitive moral development, was used to assess moral development. The test represents "...fundamental, underlying structures of social thought rather than fine descriptions of specific concepts and ideas" (Rest, 1986, p.89). The DIT supposes that individuals depending on their developmental stage, interpret moral dilemmas, define critical moral issues, and decide what is right and wrong, or good or bad differently. The test presents "forced choice" questions relative to different concepts of justice, however does not list all possible factors an individual may find important in

decision making. The DIT presents six moral dilemmas and a list of all possible issues to solve what ought to be done in particular situations. Athletes consider the relevant issues and rank those of importance. Our longitudinal studies use the P index, the relative importance placed on principled moral thinking, to determine probable moral development stages of student athletes.

How Does the ETHICS* Program Affect Cognitive Changes?

Original research by Hahm (1989) and others (Wandzilak, et al, 1988) using the DIT, found that student athletes had a significantly lower P Index score compared to their general student peers. Essentially, student athletes reasoned from a sixth-seventh grade level of development (preconventional)--one where they make decisions on what feels good to them, what's important at the moment, what others tell them to do. In contrast, non-athletes reason from a eleventh-twelfth grade level (conventional) where they have a tendency to take other's views into account and a theory of social justice when making decisions.

After studying Hahm's moral development research, as well as the research of Hall (1981), Wandzilak et. al (1988), and others, we embarked on a long term study to see if a specific type of moral education intervention program, the SBH* Maieutic Standard and a sound Philosophy of Learning, could make a difference in moral development of athletic populations. Originally, 47 student athletes were randomly selected, from a total population of 167 at a Division I school, to enroll in a moral reasoning in sport course. All student athletes, whether in the course or

serving as controls, were both pre and posttested with the DIT.

At the end of an eighteen week course, all student athletes were re-evaluated with the DIT (see Figure 3). Student athletes enrolled in the course scored significantly higher from pre (23.9 + SEM 3.16) [preconventional] to posttests (33.5 + SEM 3.10) [conventional], with the control group remaining essentially unchanged from pre (31.5 + SEM 2.22) to post (31.1 + 2.18) [conventional].

Insert Figure 3 about here

Matched pair return rates for the original study were extremely low, course = 44.7 % and control = 26.8%. Although most of the student athletes appeared focused and directed toward taking the tests, the high number of tests that did not pass the stringent consistency checks prove otherwise. When DIT scores are compared between the course and controls samples, control student athletes appear to have a higher level of principled moral thinking. However, the control DITs account for only 26.8 % of the sample. Thus, the conclusion that controls use higher principled moral thinking is suspect.

Perhaps a better understanding of the P index results for control and course student athletes can be obtained by attempting to account for the remaining 73.2% of control

and 65.3% of course scores, as well as our longitudinal study since the original study.

The current study bases the integrity of the design and results on the premise that "[d]ata must be obtained from the exact sampling units that were selected in accordance with the sampling design" (Scheaffer & Mendenhall, 1986, p.24). To do otherwise introduces biases within the study. Thus, the discussion of unmatched test return rates is used only for discussion purposes.

By using unmatched pairs, 66% of the control sample and 66% of the course group. By using unmatched pairs, control pretest scores drop to approximately (29.6) with posttest scores decreasing to (26.3). On the other hand, course pretest scores increase to 27.1 with posttest scores increasing to 33.6. These results mirror our moral reasoning studies that show control athletes significantly decreasing in their ability to morally reason over eighteen weeks, while course significantly increase over the same period (Beller & Stoll, 1992).

Matched pair data returns show that student athletes enrolled in the course increase their moral development levels, while control decreased. Although the use of unmatched pairs violates the experimental design assumptions, the results give an indication of what might have occurred if the matched rates were within acceptable standards, especially when we examine DIT scores of student athletes enrolled in the program since 1990. While the original experimental study involved a small sample size (course n=47), all student athletes entering the ETHICS*

moral reasoning intervention program are now assessed both pre-course and post-course with the DIT.

What Does ETHICS* Longitudinal Research Report?

While the original experimental study involved a small sample size (course n=47), all student athletes entering the ETHICS* moral reasoning intervention program are now assessed both pre-course and post-course with the DIT. To date, P index scores of 250 Division I student athletes involved in the intensive moral reasoning program since 1990 mirror the original study. Our longitudinal research has found little or no difference in entering (pre-course) DIT P index scores, yet the same significant increase as the original course on the post-course P index.

How Does the ETHICS* Program Affect Moral Behavior?

Since 1990, 250 student athletes have enrolled in one or more moral reasoning in sport courses, with 150 of those enrolling in two or more. During this three year period, behaviors of student athletes enrolled in these courses have become more prosocial.

Specifically, most athletes stated that they saw the importance and developed social relationships outside the sport realm. Unanimously, the athletes stated they now think before they act, especially when in group situations. Moreover, an almost universal change in caring toward others has occurred. Instead of making decisions based on personal wants and needs to the exclusion of others, they began to take others' views into account which was most dramatic during class sessions. In the beginning, athletes

seldom listened to one another, interrupted constantly, and put others' views down. Over time, they became aware of others' views and the importance to a reasoned discussion. A typical athlete stated "You had to open up in this class and see other sides--you had to see where other people were coming from--if you didn't you wouldn't get anything from the class." And "There were always arguments; we all wanted to talk at once and had to learn to listen to others."

Dramatic changes also occurred in the academic setting. GPAs are on the rise, with athletes in the program are on track to graduate and in majors with career opportunities. Generally, the more involved in the moral reasoning program, the more they realized the importance of a solid education. As one athlete stated "I now see things besides playing ball--I go to class and have raised my grades."

Specifically, with program participants in the contact sports, fighting, both on and off the field of play, has decreased with few if any student athletes involved in criminal activity. While we have seen changes occur on the field of play, it is not as dramatic as in their personal, social, or academic lives.

Does the ETHICS* Program Change an Athlete's Moral Values?

No, as one student athlete stated "I am who I am and no one is going to change me. But, this class has made me change some of my ways." And, "My mom raised me to treat others like I wanted to be treated; sometimes I forgot; the class made me remember what she taught." As such, the

program is designed to awaken student athletes to their own values, place these in the forefront, and challenge consistency of actions to those beliefs.

What are the Implications of the ETHICS* Program on Moral Development of Athlete Populations?

Good reasoning and critical thinking involves a strong philosophy of learning, a theoretical foundation, the ability to foster effective argumentation for self, peers, and students, and a knowledge of moral questions and issues. Two hundred and fifty Division I student athletes have been involved in long term moral reasoning/development education through ETHICS*, with moral development levels significantly improving from that of a hedonistic level to one using more autonomous decision making powers in an eighteen week university course.

The current longitudinal study supports the premise that if we teach student athletes to think critically and reason morally to the same extent that we teach and perfect their motor skills, moral development can and will increase, with concomitant moral behavior changes. As such, the SBH* Maieutic Method is a logical, effective, and highly dynamic methodology to significantly increase moral knowing and moral acting to produce better-educated, more socially-aware citizens for a democratic society.

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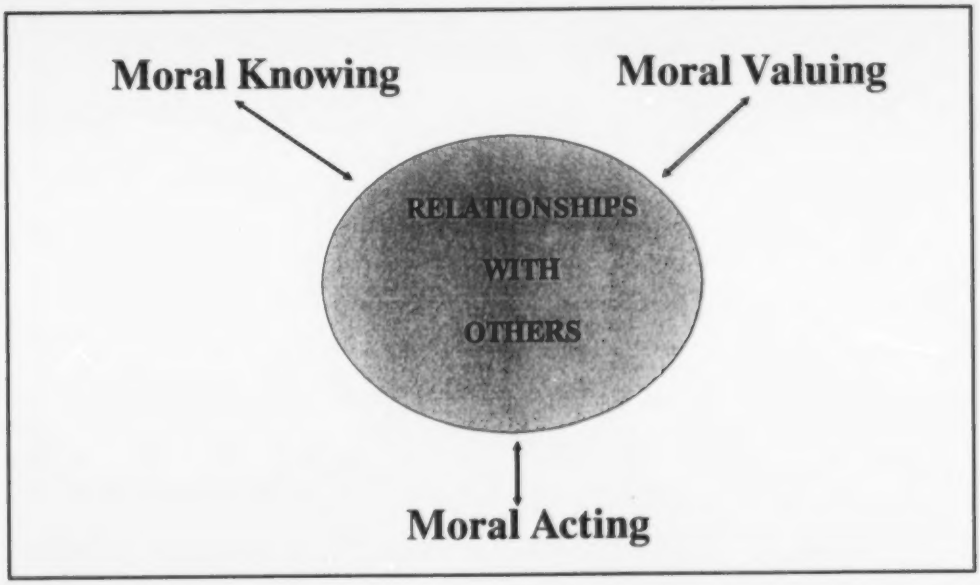

Figure 1.

The relationship of moral knowing, moral valuing, and moral acting to "relationships with others".

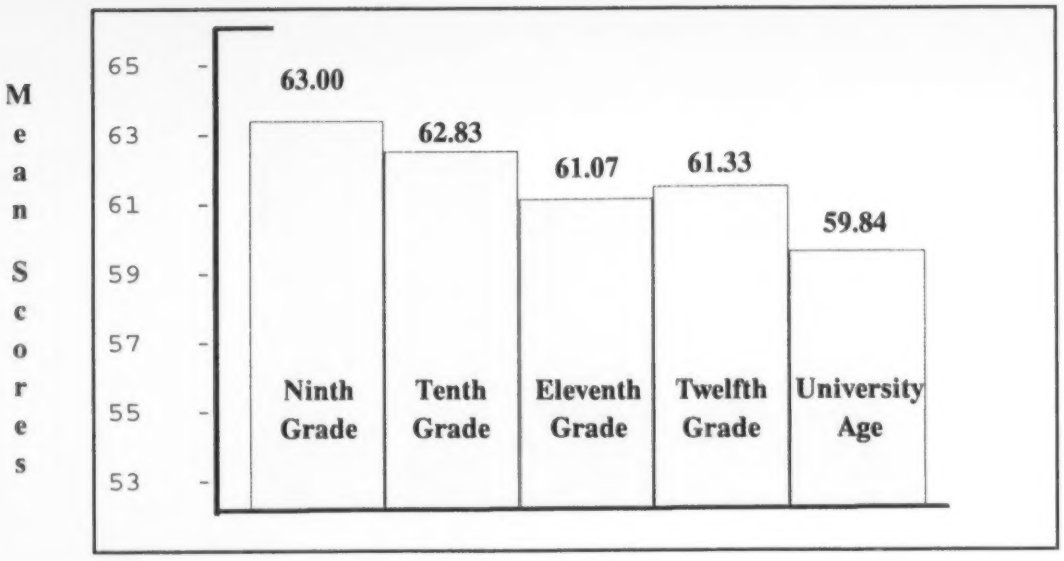

Figure 2.

Least Square Means by grade on the Hahm-Beller Values Choice Inventory for ninth grade through university age athletes.

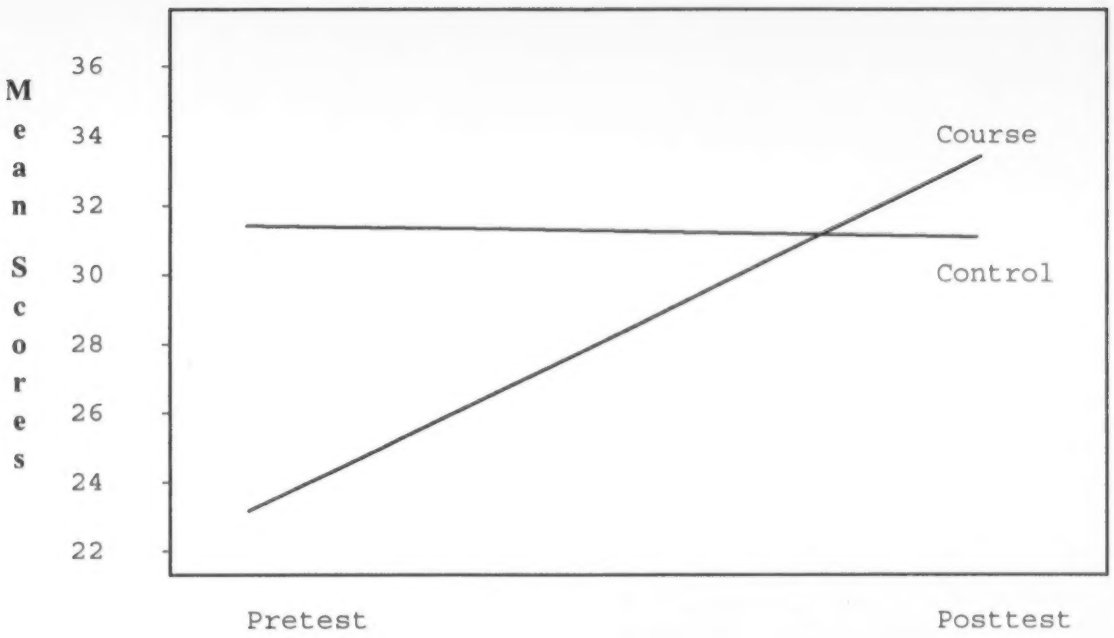

Figure 3.

Least Square Means for course and control athlete DIT P Index scores.

Note. A significant increase at the P<.05 for course athlete scores.